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**RELEVANCE OF WATER RESOURCE
FOR THE NATIONAL SECURITY**

Assoc.Prof. Anca Dinicu, PhD

”Nicolae Bălcescu” Land Forces Academy, Sibiu, Faculty of Military Science

Abstract:

The “security” concept has become extremely current, being used in the most varied fields of activity and expressing a state which, in the Cold War era, corresponded only to the state and the international environment in which it operated. With the disappearance of the system based almost exclusively on military confrontation, the old concept of security has been enriched by its imprinting with elements specific to other fields of activity, thus responding theoretically to the incredible transformations from the internal or international security environment. In this regard, it is worth mentioning the Copenhagen School according to which security has five dimensions (military, economic, political, social, ecological), but also the United Nations Development Program which, through the 1994 Human Development Report, signalled the obtuseness of the concept of security, by ignoring the individual’s daily needs. This reconsideration of the security issue has given rise to a new perspective, that of human security.

The concept of “water security”, which is at the heart of this research, has become more and more used today, thanks to the reconsideration of the importance of the water resource and its use as a political tool aimed at achieving the economic and military objectives of a state. Thus, the paper aims to analyze the concept of “water security” and to present its significance in practical terms, by highlighting some challenges that, affecting it, have consequences for the national security itself.

Key words: water security, utility, strategic character, security.

1.Introduction

Most of the time, when it comes to resources that, by their geographic location, shape the geopolitics of the world, we are tempted to think about oil and possibly natural gas. There is, however, a resource whose utility, though obvious, is often ignored or too little considered. We are talking about the water resource, absolutely vital to life - it supports the satisfaction of human needs, creates political opportunities, conditions economic development, generates wars, draws trails on the map of the world. That is why we are not talking only about the water sector itself, but about something much more complex, a condition and a guarantee of development. We are talking about the water security.

Conceptually speaking, water security involves a complex analysis of water sector determinations in economic and social fields, the identification of exposure to natural hazards, as well as the contextual understanding of the political and cultural conditions defining the environment we are referring to.

2.Method of Research

The elaboration of this paper was based on the analysis of the phenomena and data revealed by the empirical observation of the reality, as well as on the critical analysis on which the theoretical concepts are based.

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3. The Water Security Concept

The increasing importance of the water resource, given the dependence of many sectors of activity on it, has also generated an increase in the attention given to it, both by the political level responsible for the economic and military strategies as well as by the scientific, a creator of knowledge and potential partner of politics in identifying the most viable solutions to the problems a society faces.

Water security, as a concept, does not present a unitary approach, its explanation in one direction or another being greatly influenced by the geographical region of the analyzed state, by the level of economic development, but also by the political level, respectively by the degree of democratization of the politics and the society, as well as the existence and spread of governance networks.

Thus, although a relatively new direction of in-depth research, water security has received various explanations, such as:

- "The availability of an acceptable quantity and quality of water for health, livelihoods, ecosystems and production, coupled with an acceptable level of water-related risks to people, environments and economies" [1];

- "The capacity of a population to safeguard sustainable access to adequate quantities of and acceptable quality water for sustaining livelihoods, human well-being, and socio-economic development, for ensuring protection against water-borne pollution and water-related disasters, and for preserving ecosystems in a climate of peace and political stability." [2];

- "A condition in which there is sufficient quantity of water, at a fair price, and at a quality necessary to meet short and long term human needs to protect their health, safety, welfare, and productive capacity at the local, regional, state, and national levels." [3].

Analyzing the three definitions, it is necessary to consider the condition of the reference object – water – to be analyzed both quantitatively (to be acceptable, adequate or sufficient) and qualitatively (acceptable or appropriate to meet the human needs). It is then highlighted the usefulness of the water resource for different areas of human activity and existence, areas that are common to the three perspectives: health, livelihoods, ecosystems, production/productive capacity, human wellbeing/welfare/safety, and socio-economic development. And because security also refers to the feeling of being sheltered from threats, the importance of the water resource is finally emphasized by accepting the existence of water-related risks at individual, local, regional, state, and national levels. However, the definition developed under the aegis of the United Nations offers an additional element, emphasizing the political aspect of the whole picture – the climate of peace and political stability – which can then be translated into "governance", "public policy" and "institutional cooperation", i.e. "security" understood as a politically coordinated process (by the state or international governmental organizations) aimed at preserving the functional characteristics of the system to which it applies.

Speaking in terms of "water security", it is in fact highlighting the involvement of the political in achieving this dimension of security and conferring a strategic character to the water resource. The phrase created by joining "security" to "water" thus becomes a point of action on the government agenda – we are therefore in the face of a *political priority given to the issue in order to raise it to the level of a high political issue*" [4]. Water security implies the responsibility of the state not only to manage water resources properly but also to create the strategies needed to prevent the challenges that can affect the water supply, to ensure the resilience of the water infrastructure and to remove the negative consequences in case any challenges may materialize.

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Water security is therefore about food and health, about proper sanitation and economic development. But water security is also about independence, about a form of national security and about peace. How water security is conceived and contextualized can very easily make the difference between cooperation and conflict, well-being and poverty.

Given the research direction of the present paper, the manner in which the water resource can generate security in a certain geographic area, it can be said that water security is based on the distribution of water in a given region and on the accessibility of actors to the water resource, these two elements contributing to the establishment of the nature of the relations between the respective actors, as well as to the design of the power structure in the region.

4. Water Resource, A Strategic Resource

Given the particular utility of water for the socio-economic system, along with the growth of the global population, especially in less developed areas of the world, and the already-and-anticipated climate changes, it is more and more often stated whether water will be for the twenty-first century what oil was for the twentieth century, or that water became more important than oil. Or, in other words, “the only alternative to water is water”, as the former Slovenian President Danilo Turkso suggestively stated [5].

There are two issues that should be taken into account when talking about the strategic nature of water.

The first is the importance of this resource to the individual’s everyday life (with everything that it requires, including cleanliness and health) and to ensuring the economy (especially agriculture and industry), and the second concerns the geographical positioning of the hydrographic network, i.e. the level of accessibility to the water resource.

Of the two, the question of water utility is the most analyzed, and it is already addressed in this paper.

The level of civilization that mankind has reached today has made an “intimate relationship” between it and water [6]. However, we are facing an almost impossible relationship for a large part of the world’s population - on the list of resources required to meet human needs, it is not physically found on the entire dry surface of the globe. As with food security, water security also requires physical and financial access of the individual and the state to the resource in question.

If, out of the total surface of the globe, the land occupies only 29.2%, the remaining 70.8% forms the Planetary Ocean [7], where the name of the Blue Planet given to the Earth as regards the ratio of freshwater and salty water, the data in the table below are convincing but also worrying.

Water source	Percent of total water
Oceans, seas, bays	96.5
Other saline water	0.93
Freshwater (ice caps & lakes)	2.5
Other types of water source	0.07

Tabel 1. *Global water distribution*

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Unfortunately, neither the total amount of freshwater (2.5% of total water) is available for household and economy use, most of which (68.7%) being stored (blocked, it might even be said) in glaciers and permanent snow from the North Pole and the South Pole, Greenland and various mountain regions. Only 1% is concentrated in lakes, basins and surface hydrographic systems, the rest (29.9%) representing underground water [8].

Moreover, the reduced amount of water at the disposal of mankind in support of individual and national development is additionally accompanied by a continuous depreciation of its quality. Although a renewable resource (if we consider the water cycle), its quality is subject to a degradation process due to the conflicting interests of the stakeholders and the procedures it undergoes in processes whose presence and use are absolutely mandatory. Against such “aggressions”, the water, in turn, becomes harmful to the environment and to the various organisms, including the human body. This is where the importance of water management results, i.e. the planning of water use and distribution, based on a set of policies and regulations, to “to minimize damage to life and property and to maximize efficient beneficial use” [9].

The second important element, perhaps most important, to explain the strategic nature of water is that of accessibility, depending on the geographical distribution of the resource analyzed in this paper. Accessibility can resonate with national security when the analysis is done on a cross-border water network.

Globally, there are 263 river basins and cross-border lakes that can mean as many sources of conflict between states whose territories are marked by the same water resource. One can even speak of a historical connection between the conflict and the water resource, which can go even 4,000 years ago. According to Peter Gleick from the Pacific Institute [a think tank that monitors the world’s freshwater supply by providing science-based solutions to the most pressing challenges posed by global water quantity and quality], so water can be considered as a strategic, possibly conflict-generating resource, the following elements should be considered [10]:

- The degree of scarcity;
- The extent to which the water supply is shared by more than one region or state;
- The relative power of the basin states;
- The ease of access to alternative fresh water resource.

But if the water itself can be a source of conflict, it is a matter of intense debate. The belief of this paper is rather negative in this respect. Without overriding the importance of the relationship between water and security, it may be appreciated that the entire geopolitical context of a region that “hosts” the hydrographical basin under consideration must be analyzed. Thus, in the conflict analysis, other elements are also important: the historical evolution of the region, the historical nature of the relations between the states and the nations in the region, the international network to which they belong, the level of economic and military development (and, further on, the competition between these elements), the “clash of civilizations” and, first of all within the last issue, the ways of affirmation/manifestation of religious ideologies.

5. Conclusion

The concept of “water security” is in permanent dynamics, its area of reference continuously expanding as new connections are established between social phenomena. Given the daily need for water, the conditions that it can impose on the development of the national economy and the provision of an acceptable state of health and prosperity at individual level, water security can be analyzed by reference to economic security, energy security, food security, environmental security and last but not least, human security.

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Identifying a definition of water security with a high level of international acceptability is not only a question of unitary thinking, but especially a first real approach to identifying the collective response to counteracting or mitigating the negative effects generated by the specific challenges of the field.

The source of life and the beginning of all things, the water resource faces challenges that, far from being new, are continually reinventing, adapting to new realities from the international security environment.

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